Claims

1. (original) A transition for delivering an electrical signal propagating on a coaxial cable to a substrate, comprising:

an input connector adapter configured to receive and retain a coaxial cable having a central conductor;

a housing that defines a cavity having an axis;

an airline conductor situated substantially parallel to the axis of the cavity and in electrical communication with the central conductor of the coaxial cable, wherein the airline conductor and the cavity are configured to form an airline having an impedance that is substantially the same as an impedance of the coaxial cable; and

an interconnect situated on the substrate and extending into the cavity and electrically connected to the airline conductor.

- 2. (original) The transition of claim 1, wherein the cavity is cylindrical.
- 3. (original) The transition of claim 2, wherein the interconnect includes a conductive puck.
- 4. (original) The transition of claim 1, further comprising an output coaxial adapter configured to receive and retain a coaxial cable.
- 5. (original) The transition of claim 1, wherein the interconnect includes a conductive puck.
 - 6. (original) The transition of claim 5, wherein the substrate is retained by the housing.
- 7. (original) An apparatus for delivering an electrical signal from a coaxial cable to a substrate, comprising:

an airline that includes a central conductor;

Page 2 of 4

means for securing the coaxial cable to the central conductor and communicating the electrical signal to the central conductor; and

means for electrically connecting the substrate to the central conductor, situated within the airline.

- 8. (original) A method delivering an electrical signal to a substrate, comprising: configuring an airline to receive the electrical signal, wherein the airline includes a conductor and a cavity, and has a characteristic impedance corresponding to a characteristic impedance of the transmission line on which the electrical signal propagates; and contacting an interconnect region on the substrate to the airline conductor.
- 9. (original) The method of claim 8, wherein the characteristic impedance of the airline is approximately equal to the characteristic impedance of the transmission line.
- 10. (original) The method of claim 8, wherein the characteristic impedance is about 50 Ohms and the transmission line is a coaxial cable.

11-33. (cancelled)

Page 3 of 4